VIRGINIA WILDLIFE

JUNE 2002 TWO DOLLARS

Director's Column

William L. Woodfin, Jr

In the issue last month we were honored to have a message from Governor Warner. This month we are honored to bring you a message from the Honorable W. Tayloe Murphy, Jr., Secretary of Natural Resources.

To begin, I want to thank Governor Warner for selecting me to serve his administration as Secretary of Natural Resources. I am also grateful to the large number of Virginians who have called and written me to express their support and to wish me well. While I know that it will be impossible to meet all the expectations that my appointment brings, I certainly look forward to working closely with everyone in the natural resources community during the next four years to improve the quality of the Commonwealth's natural environment.

During the 18 years that I served in the House of Delegates, I had the good fortune of making many friends in the natural resource agencies, in the conservation community, and in the business, agricultural, and seafood communities. Back in January shortly after Governor Warner's inauguration, I was riding to Williamsburg with my good friend and former legislator, Whitt Clement, who is now Secretary of Transportation. He happened to mention that he had spent the afternoon with representatives of a company that manufactures highway paints, whereupon I said to him, "Whitt, do you know the difference between the job that you have and the job I have?" When he admitted that he did not, I responded, "You get to meet with the vendors, but I get to meet with my friends." There is a great deal of truth in my observation and it is why I am so pleased to hold the position to which I have been appointed.

The guiding principles for the work that we in the Natural Resources Secretariat will try to accomplish over the next four years are set forth in Article XI of the Virginia Constitution. Section 1 reads as follows:

"To the end that the people have clean air, pure water, and the use and enjoyment for recreation of adequate public lands, waters, and other natural resources, it shall be the policy of the Commonwealth to conserve, develop, and utilize its natural resources, its public lands, and its historical sites and buildings. Further, it shall be the Commonwealth's policy to protect its atmosphere, lands, and waters from pollution, impairment, or destruction, for the benefit, enjoyment, and general welfare of the people of the Commonwealth."

Additionally, Section 4 of this article, which was adopted a couple of years ago states: *"The people have a right to hunt, fish, and harvest game, subject to such regulations and restrictions as the General Assembly may prescribe by general law."*

In the months ahead, we will be working to establish a cooperative relationship between all stakeholders to further the cause of natural resource conservation in the Commonwealth. We will be working to find ways to expand the constituencies that support our natural resource programs well beyond the traditional ones. We will be reaching out to our school age constituents to ensure continuous, long-term support for natural resource conservation. We expect to be quite busy.

In closing, I just want to say how much I respect and appreciate the work of the Department of Game and Inland Fisheries, its Board, and its Director, Mr. Bill Woodfin. In his article last month, Governor Warner talked of our commitment to maintain a strong Virginia Department of Game and Inland Fisheries. We certainly look forward to upholding that commitment.

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Cover: Flathead catfish *(Pylodictis olivaris)* by ©Bill Lindner Photography

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Dedicated to the Conservation of Virginia's Wildlife and Natural Resources

VOLUME 63 NUMBER 6

The Birds of Grandvie

by Brian Taber

The old saying, "good things come in small packages" certainly holds true for this fragile, sliver of coastal paradise in Hampton on the shore of the Chesapeake Bay.

I waded through the cold, February water and onto the far shore, where the least tern colony would be in another three months. In more than 20 years of studying birds here, I would see the colony on an island for the first time, thanks to a powerful northeaster that sliced an inlet through a half-mile stretch of beach. Luckily it was a falling tide, so I had time to walk through the several acres of sand and grass at the end of the fragile, two-mile long peninsula that is Grandview Beach.

There were hundreds of gulls standing on tiny islands throughout the inlet, including a single, rare Iceland gull, bright white against gray-blue water and sky. More than a thousand brant were

Lee Walker

Ruth Beck, with the College of William and Mary, regularly surveys Grandview Beach for bird activity.

Lee Walker

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huddled in the water on the western edge of the island, escaping some of the icy wind of the receding storm.

Those of us who regularly come to Grandview had predicted the inlet. For several years the southside of the colony had been losing sand and wax myrtle thickets. While the Bay redistributed sand on the east side, the marshy west side was being influenced by Back River. The area was vulnerable and had been de-stabilizing rapidly. What the new geography meant for the colony was yet to be determined. It could mean fewer predators, such as raccoons and foxes, which might not be inclined to swim. But it could also mean a shrinking island that would eventually disappear, threatening the largest East Coast colony of least terns.

Grandview Beach, in Hampton, on the shore of the Chesapeake Bay, is a haven in the midst of urbanization. Huge ships move through the busy, nearby Hampton Roads harbor and jets from Langley Air Force Base regularly scream overhead. Yet, there is tremendous bird life at Grandview, which is why I have come here so often. The combination of a mild southeast Virginia climate and the abundance of food in the Bay have been attractive to wildlife, probably for many thousands of years.

Except for occasional storms, the beach is washed by the gentle waves of the estuary. Yet even gentle waves eventually transform land. The metal geological survey marker pole that we used to walk past (that marked the dunes on the east boundary of the colony) now stands more than a hundred yards out in the water. The whole beach is alive with birds migrating westward toward the marsh. Old tree stumps along the beach show where forests once stood and indicate that the process has been in motion for a very long time.

Depending on the weather and time of year, a variety of different birds show up at Grandview Beach, like (opposite page) osprey *(Pandian haliaetus)*, least terns *(Stenrna antillarum)*, and (below) brightly colored yellow warblers *(Dendrocia petechia)*.

©Rob & Ann Simpson

Lee Walker

Lee Walker

Above: With few predators, like foxes and raccoons, Grandview Beach has become an important nesting area for many kinds of birds.

I come to Grandview in all months because the bird life is always changing. I have come across 200 species and surely many more have been there. During fall migration, tens of thousands of songbirds and hawks, many only a few months old, pour through the area headed for warmer climates, maybe as far away as South America. Because there are few trees, most are seen on the wing, just passing through, early or late in the day. Many move only at night. Clouds of tree swallows, which move throughout the day, dart and dive, then disappear.

Winter brings waterfowl and the wintering gulls to the shore, where there is usually ice-free water and lots of food. With luck and perseverance, a harlequin duck might be found around the old lighthouse rocks, or a seldom-seen little gull. Flocks of sparrows and blackbirds fill the dense safety of the marshes. Sometimes rare sedge wrens, American bitterns, red-necked grebes, short-eared owls, LeConte's sparrows, snow buntings, and Lapland longspurs appear. Both species of sharp-tailed sparrows skulk in the wet grasses. In March 1995, Virginia's first black-tailed gull was found by one of the least tern colony's best supporters, Bill Akers, who completed a Master's thesis on the terns at the College of William and Mary. The gull was far from its usual Asian range. In winter, a few "ipswich" sparrows can be found. They are an unusual pale race of the Savannah sparrow.

Spring brings thousands of shorebirds to the water's edge, including rarely seen Wilson's and piping plovers. Uncommon shorebirds, such as purple sandpipers and red knots may be found. Graceful egrets and herons of several species cruise quietly above the marshes. The lack of forested areas causes most of the warblers, vireos, cuckoos, tanagers, orioles, and flycatchers to skirt Grandview's marshes and beach, though its wax myrtle thickets host yellow-rumped and yellow warblers in large numbers. Rarely are willow flycatchers and Swainson's thrushes seen.

Laughing gulls and several species of terns become common in spring, following the growing supplies of fish returning to the Bay. Mating activities are evident, such as exchanging food, unusual posturing, nest building, and copulation. Occasionally, even as late as mid-June, some northern birds, such as glaucous gulls, common loons, surf scoters, and king eiders, which should be nesting far away, are still around, perhaps confused or unable to make the journey.

Summer is the season for rearing young birds. Marsh wrens and seaside sparrows raise their families in the salt marsh. Purple martins hawk insects over the open areas to feed

©Joe McDonald

Lee Walker

Above: Warning signs remind visitors to Grandview Beach that this small, fragile strip of sand is a refuge for wildlife and that interference by people could prove very detrimental to the beach and its wild inhabitants.

themselves and their young. In the thickets, northern cardinals, brown thrashers, Carolina wrens, eastern towhees, and American robins are among the familiar and most-seen breeders. Giant brown pelicans, re-establishing themselves in Virginia after several decades of decline, glide overhead. They are even breeding just 17 miles across the Bay on Fisherman Island, which is visible through binoculars from Grandview on a clear day. A very rare sight in a secluded brackish pond in the marsh is a pied-billed grebe, with young riding on its back, or an elusive, multicolored least bittern.

But the spectacular summer show is the least tern colony at the north end of Grandview. I feel comfortable writing about the area only because the efforts of the City of Hampton, the College of William and Mary, and the Virginia Department of Game and Inland Fisheries have been so successful at informing the public about the sensitivity of the area. For many years, it seemed best to let the birds have a low profile. The terns are easily disturbed, so warning signs are conspicuously posted all around the colony perimeter. Staff members are now regularly located at the colony to alert boaters and beach goers to the danger of any interference.

A few other birds also nest at the colony, including American oystercatchers, willets, common terns, and killdeer. Endangered piping plovers, never common at the colony, are no longer annual breeders there. Black skimmers are often seen loafing in groups on the beach or performing their trademark feeding technique, lower bill just under the surface as they fly.

Eyeing the colony from shallow water nearby are gangs of huge, hungry, opportunistic great black-backed gulls with even hungrier, immature birds to keep fed. The adult terns, 400 of them in 1999, must be vigilant, but their power as a group against intruders is considerable. Except for fish-eating ospreys, there are few birds of prey in the area to worry the colony, but boat-tailed grackles, fish crows, and even ghost crabs can do significant damage.

Most birds are good at adapting, but some have strict requirements for their survival. This type of habitat: beach, dunes, and marsh, has been popular with people and has been disappearing all along the East Coast. Where will the least terns go if their colony site is lost? The pressures from both people and natural processes will be challenges to overcome for the birds of Grandview Beach. □

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A yellow-rumped or commonly called "Myrtle" warbler *(Debdricua ciribata)* is another frequent visitor to Grandview Beach.

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Above: On warm, calm, summer days the black skimmer *(Rynchops niger)* gracefully flies with its bill lowered into the water in search of food. Right: The brown pelican *(Pelecanus occidentalis)*, on the other hand, feeds on fish by diving and crashing bill first into the water.

Brian Taber is president of the Coastal Virginia Wildlife Observatory and a graduate of The College of William and Mary. He has been visiting Grandview Beach since 1974.

New River

Fisheries biologists are hard at work trying to improve your chances at catching one of Virginia's most illusive sport fish.

by George C. Palmer
and Joe Williams
photos by Dwight Dyke

Hooking into a big walleye is a favorite dream of many anglers, especially in southwestern Virginia. In the last seven years, the Virginia walleye state record has been broken four times, and now stands at 15 pounds 15 ounces. These fish all have been caught from the upper New River in southwest Virginia. In this flowing environment, near boulders, bedrock formations, and undercut banks, lurks the toothy predator, highly prized for sport and food. The walleye's reputation holds its own among anglers, however; many Virginia anglers are unfamiliar with the ways of walleye, and catching them can be a mystery.

From its origins in North Carolina, the New River flows north through southwest Virginia and into West Virginia. It is one of the oldest rivers in the world and recently has been named an American Heritage River. The New has an impressive list of sport fish; current state size records for smallmouth bass and musky also came from this river. Walleye were first stocked in the 1920s; however, there may have been a resident population prior to stocking. Therefore, the walleye in the New River in Virginia could be descendants of a native strain. In the New River, walleye are predominately located in areas upstream of Claytor Lake in Pulaski, Carroll, and Wythe Counties.

For years, anglers have targeted walleye in the river. The Virginia Department of Game and Inland Fisheries (VDGIF) has worked to im-

prove understanding and management of walleye. To learn more about these elusive fish, VDGIF and Virginia Tech's Department of Fisheries and Wildlife Sciences studied the walleye populations in Claytor Lake and the upper New River. Using state-of-the-art radio telemetry and genetics techniques, biologists have discovered some of the habits and traits of walleyes.

In 1997, 20 walleye from the upper New River and 20 from Claytor Lake were implanted with radio transmitters. The goal was to determine where walleye reside, move, and spawn. In addition, walleye were collected in order to compare genetic characteristics of New River walleye to those in other areas of North America and Canada. The radio tracking allowed biologists to determine those areas of the lake and river used by walleye on a regular basis, and the genetic analysis helped answer questions about the origins and mixing of walleye stocks.

Walleye

Results of the two-year study indicated that there are two different walleye populations living in the Claytor Lake and the upper New River area. One population resides in the lake and another in the upper river. These populations remain separate throughout most of the year. However, during the spawning season, the two walleye populations can mix at one of three spawning areas: Allisonia, which is the first riffle area above Claytor Lake; Fosters Falls, which is located 11 miles above Allisonia, and Buck Dam, located 23 miles above Allisonia.

Radio implanted walleye congregated at each site during the spawn. The genetic survey showed the river walleye (New River stock) to be genetically different from the lake walleyes (stocked from northern waters within the United States), and district fisheries biologists began working on a plan to reestablish the unique river stock.

In spring 2000 and 2001, biologists collected male and female walleye from the spawning areas at Fosters Falls and Buck Dam. After having them genetically identified biologists selected several of the New River stock walleye and took them to the Buller Fish Cultural Station. The walleye were spawned at the hatchery, and after hatching, the fry were placed in growing ponds. These young fish were stocked back into the New River near the spawning areas where their parents were collected. To date, approximately 500,000 walleye fry (3–4 days old)

Left: Catching walleye like these in the New River is not uncommon for the angler who takes the time to learn more about these elusive fish.

Fishing live minnows, floating and shallow diving plugs, spinners, spoons, or jigs can be very effective. Fishing the river in the day can be fruitful, but overcast days and evenings are the most productive.

Walleye fishing in the river is best in the early spring when walleye move to spawn. The remnant population of walleye residing in the lake moves out and into the river to spawn from March through April. The lake walleye population has declined in recent years since stocking efforts are focusing on the New River walleye stock. River walleye stocks generally move upstream to spawning areas. Spawning generally occurs when the water temperature is about 50° F. Walleye can be

Above: In the last seven years the Virginia walleye state record has been broken four times. Currently the honor for this distinction goes to Anthony P. Duncan who landed a 15 pound 15 ounce walleye in the New River on December 15, 2000.

and 10,000 walleye fingerlings (5–6 weeks old) have been stocked back into the New River. In the years to come, biologists will continue this practice in hopes of reestablishing the New River walleye stock, and at the same time they will be reviewing current management regulations.

To catch walleye in the upper New River, look for pool areas below riffles. Walleye feed heavily on all types of minnows at night.

caught when they are moving to their spawning grounds and again when they return from spawning. They probably will not feed much while at the spawning grounds, which makes them difficult to catch. The Allisonia area is a "stones-throw" away from a VDGIF boat launch area and is utilized by a small number of river walleye. Since Claytor Lake has not been stocked with walleye since 1996, there is no longer a big spawning run to the Allisonia riffles. The Fosters Falls spawning ground is located in a state park, (New River Trail State Park) with great boat access both above and below the falls. Additionally, both areas have bank fishing access. The Buck Dam site is presently undeveloped; however, a parking area and a river access trail will be constructed in 2002. This is a joint project by VDGIF and American Electric Power. The Austinville area of the river, (located between Buck Dam and Fosters Falls) is a large pool several miles in length (with a VDGIF boat ramp) that offers excellent walleye fishing. If you want to catch walleye, one of these locations is your best bet.

Above: Fisheries biologists have implanted radio transmitters into walleye to help understand their habits, which include where they reside, move, and spawn. Below: VDGIF fish hatcheries, like the Front Royal Fish Cultural Station in Strasburg, hatch and raise walleye to stock into many of Virginia's lakes and rivers like the New.

Walleye fishing in Virginia can be both fun and rewarding. Walleye are of special interest to VDGIF because they offer so much to the angling public. The management of walleye continues to improve as research provides more insights into the walleye's habits. The study described above gives anglers plenty of information about the ways of the elusive walleye and, hopefully, will improve their chances of hooking into a prized New River walleye. ☐

George Palmer and Joe Williams are district fisheries biologists with the Virginia Department of Game and Inland Fisheries in Southwest Virginia.

River-Run FLA

Summertime means topnotch catfishing in the Commonwealth. Here's a statewide primer on the "other" catfish—Virginia's river-run flatheads.

story by Marc N. McGlade

The Labrador retriever has been dubbed as the "walking stomach." I can attest to this, as my yellow Lab, Bailey, will inhale anything her sniffer deems edible. With that moniker in mind, the flathead catfish could easily be called the "swimming stomach." These tackle-

©Marc N. McGlade

testers eat anything and everything in their path and leave nothing in their wake. Sporting an insatiable appetite, this misunderstood species roams the deep holes and pools in Virginia's scenic rivers.

Many anglers are truly unaware of this fish species and Virginia's many fisheries that sustain flathead populations. The beauty of this type of angling is that it doesn't require fancy gear, electronics, and high-dollar boats. Flathead fishing is neither hard nor expensive, and although flatties have intricate habits, their most basic need is eating, which they love to do all summer long.

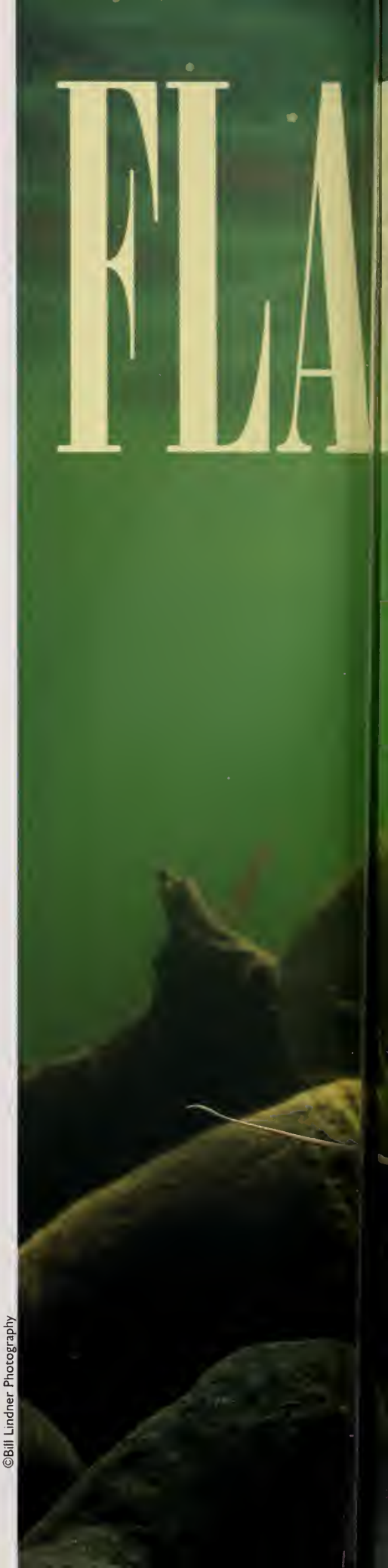
While the blue cats in the tidal James and Rappahannock Rivers receive the most notoriety, the flatheads of the Dan, Roanoke (Staunton), Clinch, New, and James Rivers are worth mentioning too.

If you're thirsting for a freshwater fish as large as a Blue Ribbon hunting dog and as strong as a pit bull, look to the flathead.

Rigs and Techniques for Flatheads

Much of the fun in flathead fishing stems from collecting bait. Live sunfish species are usually the "bait du jour" for flatheads. Live bream must be collected by hook-and-line methods; using cast nets to gather them is illegal. So, hop in the canoe, johnboat, or simply wade through the river casting small curly-tailed grubs, tube lures, or use live worms

A rubber raft is an excellent choice to navigate rivers and fish for flathead catfish, demonstrated by this group, as a lucky angler battles a big flathead.



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THEADS

on a small hook to catch some wily bream.

Flatheads are opportunistic, and certainly won't turn down an occasional offering of live minnows, shad, night crawlers, or other baits; but, in general, their favorite morsels are bream. One key to catching jumbo flatheads is to always use fresh bait.

A fish-finder rig is the quintessential bottom-fishing ensemble that uses a sinker, leader, and hook. Circle hooks are necessary for catch-and-release and make hook removal easy. Circle hooks usually snare the fish in the corner of its mouth, rendering release a simple twist of the hook, unlike other hook types where fish can easily swallow them.

"I like to attach a 90-pound barrel swivel to a leader, then place a bead above the swivel, followed by a 1 to 3-ounce bank sinker," said Mike Ostrander, of the James River Fishing School. Ostrander ties an 18 to 24-inch leader, consisting of 50-pound monofilament line to the circle hook.

The most popular outfits for flathead angling are either spinning rods paired with baitrunner reels or baitcasting rods with reels that have a built-in clicker feature.

"As for line class ratings," added Ostrander, "20-pound-test line should suffice." Virginia's state-record flathead is 66 ¼ pounds, and the rivers showcased in this article have fish in the 15 to 40-pound range, so leave the 8-pound test at home.

"If you're fortunate enough to get a bite from a hungry flathead, wait for a steady pull of 6 feet or more before setting the hook," Ostrander said. A true hook-set isn't necessary with circle hooks; simply sweep the rod into fighting position and keep constant pressure on the fish.

Fan-cast multiple rigs to catfish lairs to get the most coverage out of a given hole. Pepper likely areas and vary the depth of each rig.

"If the bream is calm for a few minutes, and all of a sudden it begins throbbing on the end of the line it usually signifies a flathead is approaching," said Ostrander. If a monster flathead is in the neighborhood and eyeing your bream for a quick snack, hold on because the fun is about to commence.

As the grueling fight wanes, be prepared to land the mighty flathead with either a landing net or don a glove to grab them by the lower jaw if a net isn't available. One caveat: Don't horse these fish and certainly don't bring them in too "green," or you'll have your hands full.

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Top: Guide Mike Ostrander, (right), gives instructions to anglers in preparation for flathead fishing. Ostrander says to keep it simple by using a leadhead jig and curly-tailed grub to catch bream as bait, and a bank sinker, swivel, bead and circle hook to catch flatheads.

Dan and Roanoke (Staunton) Rivers

Scott Smith, fisheries biologist with the Virginia Department of Game and Inland Fisheries (VDGIF) indicates the Dan and Roanoke Rivers are excellent flathead locales, with specimens to 30 and 40 pounds.

"These two rivers have some deep holes and channels, so they aren't very suitable for wading; however, they're perfect for johnboats, canoes, bank fishing, and even bass boats," Smith said.

"The stretch on the Dan River from Danville down to the Staunton River State Park, and the Leesville Dam down to the Staunton River State Park on the Roanoke River," he continued, "are the prime flathead areas on both rivers." These two rivers converge to form Virginia's largest lake, Buggs Island.

VDGIF fisheries biologist, Dan Wilson, agrees. "There is a large concentration of big flatheads at the confluence of both rivers," he said. "However, we find flatheads throughout both systems. We collect them in all our samples, but as a general rule, the deeper pools hold the biggest fish."

In addition to bream, shad

continued on page 23

Landscaping for Wildlife

©Marlene A. Condon

by
Marlene A. Condon

How would you like to step outside your door every day knowing that you might get to see a new animal or plant in your yard? If you create a "mini" wildlife refuge around your house, that is exactly what you can expect.

With every sunrise each new day will begin with the promise of surprise and excitement. You will learn more about nature than you ever thought possible, and you will be enthralled by the huge variety of creatures that will share your land with you.

©Marlene A. Condon

Creating a wildlife refuge in your own yard is easier than you think.

Over the course of the growing season, spring through fall, you may tally up as many as *four dozen species* of butterflies visiting your plants. Over the course of a few years, you may discover *over 100 species* of birds have stopped by and/or nested in your yard. Rabbits may reproduce and delight you and your children with baby bunnies. And if you install even a little artificial pond or water garden, you can listen to frogs calling for mates and be amazed by

Previous page: Birds such as this American goldfinch are attracted to the sound of dripping water.
Above: Many naturalized plants, such as dames rocket provide copious quantities of nectar for insects like the American Lady butterfly. Left: Our native common spicebush provides fruit for mammals and birds, and leaves for the caterpillars of spicebush swallowtail butterflies. Right: Asiatic lilies are beautiful to human eyes and nectar-rich for insects, such as this eastern tiger swallowtail butterfly.

©Marlene A. Condon

the variety of insects that manage to find your pond and call it home. With an understanding of the basic idea behind landscaping for wildlife, just about anyone should be able to provide good habitat for the creatures that share our planet.

©Marlene A. Condon

Left: When allowed to grow into its natural shape and size, Chinese photinia provides cover and nesting sites for birds, numerous blossoms full of nectar in early spring for insects, and bright red fruit in fall for mammals and birds.

The Basics

Let's start at the beginning with the fundamental information that you need to be aware of in order to start planning your wildlife haven. All gardening efforts should be preplanned to avoid making costly mistakes, either in terms of money or your time. In order for animals to inhabit your yard, you need to furnish food, cover (for protection from weather and predators), nesting sites, and water.

Even if you live in suburbia or the city, you can provide food for wildlife by growing lots of nectar- and seed-bearing flowers and vines, and fruit-bearing shrubs and small trees. If you can grow several shrubs or trees together to form a hedge, birds can nest here. The hedge will also furnish a thick growth of cover so animals can try to escape from predators. However, please remember that native predators—unlike house cats, which cause excessive predation on wildlife—keep prey populations under control, so they should be welcomed to your yard. And if you mulch your plants, reptiles such as turtles and lizards will lay eggs under the decomposing material.

©Marlene A. Condon

Minimize Your Lawn

Growing a variety of plants will minimize the size of your lawn, but that's okay because a lawn provides very little food and no cover for wildlife. A large expanse of green grass is virtually devoid of life compared to an area lush with the growth of other kinds of plants.

But this is not to say that you should not have any lawn at all. A lawn minimizes how much dirt is tracked into the house, and it is a great place for adults to socialize and for children to play. However, most people have much more lawn than is necessary for these functions, creating an unnecessary scarcity of habitat for wildlife and an increase in human labor to maintain the green blades of grass. Wouldn't you rather watch butterflies, birds, toads, and bunnies than spend a fair proportion of your life mowing?

©Marlene A. Condon

Above: If you grow your plants in thick stands like this dames rocket you will notice it less if a few plants are eaten by rabbits or deer. Left: It is best to grow different kinds of plants mixed together just as would happen naturally in a field. These four-o'-clocks and sunflowers make a pretty combination.

Many animals are becoming scarce as humans change the landscape by sowing grass seed around most of their property and over-utilizing weed killers and fertilizers. We can help wildlife, though, by growing lots of other plants instead of grass. And by doing this, we help ourselves as well because less lawn means less mowing, less air and noise pollution, and less need of chemicals in our environment.

Water

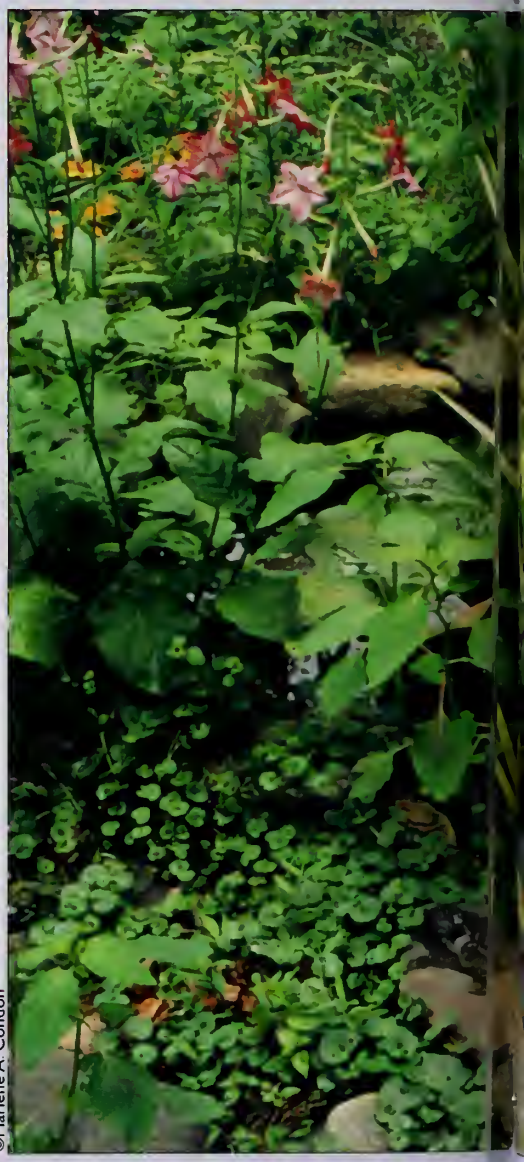
A vital requirement of all animals is water. This can be provided by putting out a birdbath (preferably placed on the ground), supplying a shallow dish (no more than 1½ inches deep) of fresh water daily, or—better yet—by installing a small pond (as small as 2 x 3 feet). If you put in a pond, you will be astonished by all of the animals that will visit for a drink, perhaps for a bath, to reproduce, or possibly to live there!

Many of our amphibians, such as salamanders and toads, have great difficulty finding a wet spot in which to lay their eggs. In the absence of more suitable breeding sites, these animals may instead lay eggs in puddles that will dry up long before the eggs have a chance to hatch or before the tadpoles will have a chance to grow up. By providing a permanent body of water, you add an important habitat component to your landscape, especially since numerous species are already rare because wetlands are frequently drained for development.

If you are enthralled by dragonflies and their smaller relatives, the damselflies, you will be delighted with the variety of these insects that will come to your pond to reproduce. The immature forms of these creatures, known as larvae, live underwater until they are ready to

©Maslowski Photo

Above: A northern cardinal cleans its feathers in a shallow birdbath on the ground. Toads and other ground-dwelling creatures will also use such baths for drinking water.



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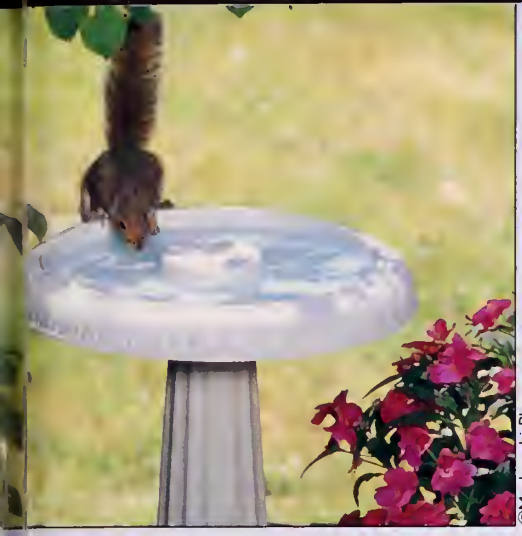

©Maslowski Photo

It is not difficult to put a watery oasis in your yard. Many gardening centers carry preformed plastic pond liners. Quite a few nurseries nowadays also stock water plants that you will need to make your pond function naturally. Be sure to avoid non-native aquatic plants that could become a problem in our waterways. Garden centers advise you to completely clean out ponds in the fall, but this is not necessary in a naturally functioning pond. Many of the animals living in the pond may be hurt or killed if you remove everything from their watery habitat. Remove leaves and other debris on a regular basis.

change into the adult forms that we are so familiar with. If you get a chance to observe the larvae, you will be shocked by how different their appearance is from the adults. A book on pond life will help you to identify the organisms in your pond.

Control Your Pets

In a yard designed to attract wildlife, cats and dogs should not be allowed to run freely. Pets can discourage, harm, or kill the animals you are enticing to visit. There is more important information about keeping cats indoors at the American Bird Conservancy Web site, at www.abc.org.

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Above left: An eastern gray squirrel stops by for a quick drink at a birdbath on a pedestal. Above: Feral and pet cats kill a significant amount of wildlife, including reptiles, birds, insects, and mammals, such as this squirrel.

Proper Gardening

It is important to avoid pesticides in your mini refuge to minimize harm to wildlife. Beautiful flowers, vegetables, trees, vines, shrubs, and, yes, even grass, can be had without

Left: Even small ponds or water gardens can provide water for drinking as well as an environment for frogs and salamanders to reproduce in. Below: Beautiful, tasty, and healthful food can be grown without pesticides in a yard full of wildlife where natural predators minimize damage to crops.

©Marlene A. Condon

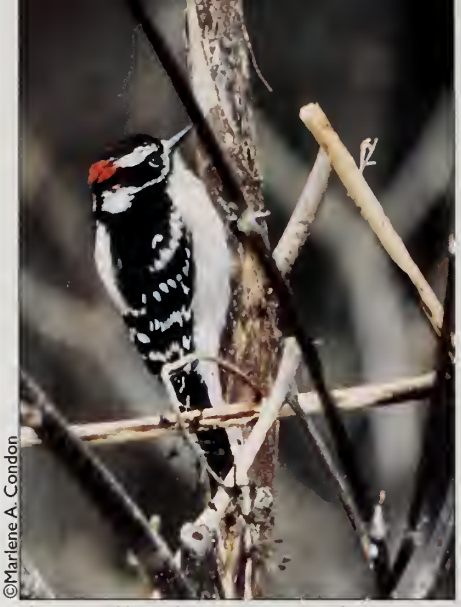
the use of pesticides. You simply have to put the right plants in the right place and tend to their basic needs: that is, grow them where their requirements for light, moisture, and soil conditions are met.

Plants that are stressed by improper growing conditions tend to have problems with insects or diseases, and that is because they are weakened and not healthy. If you have problems after planting, something is wrong.

Determine whether it has to do with the amount of light, which may be too much or too little. Check the amount of soil moisture to make sure it is not too wet or too dry. Have the soil pH (the degree of alkalinity or acidity) tested by your county extension agent if you are not sure what it is. The tilth (the degree of crumbliness of the surface layer of soil) must also be suitable. You may have to move plants to more appropriate spots on your property.

Snags and Brush Piles

Dead trees, called snags, and brush piles (assemblages of twigs, branches, and logs intertwined) will provide more cover in your yard. Dead trees are necessary for cavity-nesting animals, such as squirrels and some species of birds. Insects that nest within snags or which eat the decaying wood also provide food for birds, such as woodpeckers, and small mammals.



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Above: Keeping snags and dead trees in the yard will allow insect-eating birds like this downy woodpecker to find food naturally.

If you are worried about dead trees falling over, keep in mind that pine trees rot quickly and present more of a hazard than dead hardwood trees ("hardwood" refers to most deciduous or leaf-losing trees). A hardwood snag takes many, many years to fall over, so you may be able to fit at least one into your landscape, perhaps back in a corner where people rarely venture. Removing branches, maybe shortening the height of the snag, and keeping an eye on the snag's deterioration over time may diminish the possibility of an accident occurring.

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Above: Eastern cottontail rabbits are cute additions to the landscape and not a problem if you grow lots of plants.

You can make a brush pile with the branches you cut from the snag or from other pruned plants. Some species of birds like to nest at the bottom of brush piles, and other species sleep in them during the winter months. A rabbit might make a nest under a brush pile and give birth to her young there. After the brush pile has been there awhile, lizards might lay their eggs in the rotting debris beneath it, and you may find interesting animals, such as pillbugs, that live upon the decaying matter.

©Maslowski Photo

Carolina wrens will nest in bird boxes, but they prefer an open shelf upon which to build their spherically shaped covered nest. Below: Even grosbeaks do not visit the southern United States every year, but when they do, they might be seen at feeders filled with sunflower seeds.

Birdhouses and Feeders

Birdhouses and feeders are less "natural" additions to your landscape design, but they will improve

©Rob & Ann Simpson

your habitat if you do not have enough plants and dead trees to adequately furnish nesting sites or provide food. Mammals, such as flying squirrels, may also nest in the "bird" houses.

Go Natural!

If you live in the country, the more natural you can leave your land, the more successful it will be in terms of wildlife. If you move to a rural area in order to see wildlife but immediately start clearing the land for a lawn, you will totally destroy the habitat that is absolutely necessary for the survival of the creatures already living there. The more wildflowers, wild grasses, and native shrubs and trees that you can keep or plant, the better.

If you choose to live in the middle of what used to be a field, consider allowing most of your property to *remain* a field. There are many animals that simply cannot exist without the cover and food provided by the tall wild grasses and wildflowers that grow naturally here (prime examples are the northern bobwhite quail and the American woodcock).

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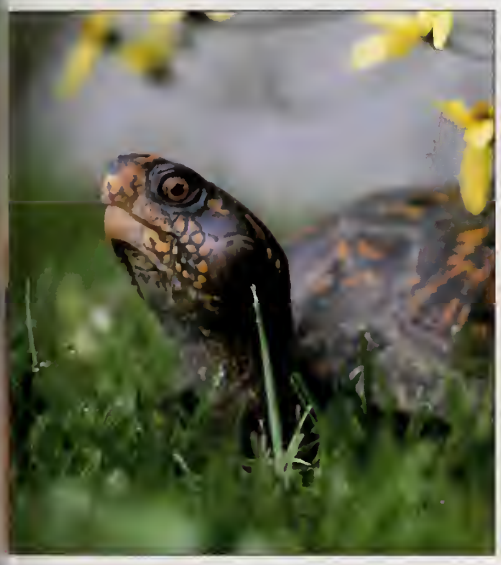

Above: The juvenile form of the eastern newt is called a red eft and it lives on land for 2–5 years providing natural insect control. Left: An eastern box turtle helps clean up the yard by eating carrion as well as overripe fruit that has fallen to the ground.

However, grassland birds and other species are not likely to get much benefit from the field if it is entirely fescue. If you allow your field to grow, only cut it in early spring, so wildlife can make use of the cover and seeds provided by the plants throughout the rest of the year.

A Nature Wonderland

If you try your best to accommodate our wildlife's needs, your reward will be the opportunity to spend hours watching and learning about the wonderful world of nature. Every day will be an adventure, because you just never know what new creature might be awaiting your discovery in the yard.

Why settle for a typical, "boring" landscape when you can have an exciting nature wonderland right in your own yard. □

Above: If your house is located in a field, the easiest course to take is to let the field grow tall with grasses and wildflowers. It can be a pretty sight to behold, especially after it becomes "home" to many forms of wildlife.
Next page: American robin ©Maslowski Photo.

Marlene A. Condon, a nature writer and photographer for many publications, specializes in landscaping for wildlife. The National Wildlife Federation and the Virginia Department of Game and Inland Fisheries certified her yard as a backyard wildlife habitat, and WVPT in Harrisonburg, Virginia, has showcased Marlene's yard on public television. Marlene can be reached at Rural Route 2, Box 340-D, Crozet, VA 22932-2204

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species are a good bait choice because they are so plentiful, particularly in the Roanoke River. There aren't as many shad in the Dan, however.

"The Dan River doesn't have as many deep holes as the Roanoke," Wilson said, "but we find that the logjams and woody debris along the banks in the Dan hold the most flatheads."

These big obstructions enable the current to scour the bank and create a deeper pocket—a custom-ordered lair for a big whisker.

On the Roanoke, the topography changes drastically above Brookneal. The stretch from Brookneal up to the Leesville Dam does have deep pools, but much of it is shallow—a candidate for a canoe or jet-drive boat, advises Wilson.

"Generally speaking," said Wilson, "flathead fishing is best below Altavista on the Roanoke."

Available ramps along the Dan include: Dan River Park, Danville, Milton, N.C., South Boston, Hyco River, Aarons Creek, and Staunton River State Park. Boat landing access points on the Roanoke include: Altavista, Long Island, Brookneal, Watkins Bridge, Route 360 near Clover, and Staunton River State Park.

Clinch and New Rivers

Southwestern Virginia can at times get lost in the shuffle since the prime blue and channel catfish destinations reside primarily in the Coastal Plain of the Commonwealth. However, flatheads are different, and the often-overlooked Clinch and New Rivers have their fair share of these whiskered brutes.

"The Clinch has native flatheads because it's part of the Tennessee River system—where flatheads are native," said Tom Hampton, a VDGIF fisheries biologist. Hampton indicates flatties have reached 40 pounds in the Clinch, although the average fish is in the 6 to 10-pound range.

"The stretch of river below Saint Paul, in Scott County, has deep pools. Cleveland and Carbo have them as well, and these are good flathead areas," Hampton said.

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Catch-and-release is vital for sustaining the trophy fishery that exists on many of Virginia's top rivers. Grabbing a flathead by the lower jaw is the proper way to land and release a flathead if a landing net is unavailable.

Hampton also recommends "The Retch"—above Fort Blackmore—because there is an excellent flathead pool. "This pool is too deep to wade," said Hampton, "but other parts of the main river are excellent for wading."

VDGIF and the Tennessee Valley Authority developed several access points along the river. The uppermost launch site is located at Blackford, in Russell County, and the last take-out is near the Tennessee state line. These are suitable for small boats or canoes. Two concrete ramps at Dungannon and Clinchport provide motorboat access to a short section of river during high water.

When anglers mention the New River, many thoughts come to mind. One is its misnomer, since the "New" is the second-oldest river in the world. Another quirk is that it flows north from North Carolina, through Virginia, and into West Virginia.

Joe Williams is a fisheries biologist with VDGIF, and he said flatheads are available throughout the entire New River system, including Claytor Lake. Williams has seen flatheads reach 30 pounds in the New.

The New River is conducive for flathead fishing from a johnboat, canoe, or in some spots, wading.

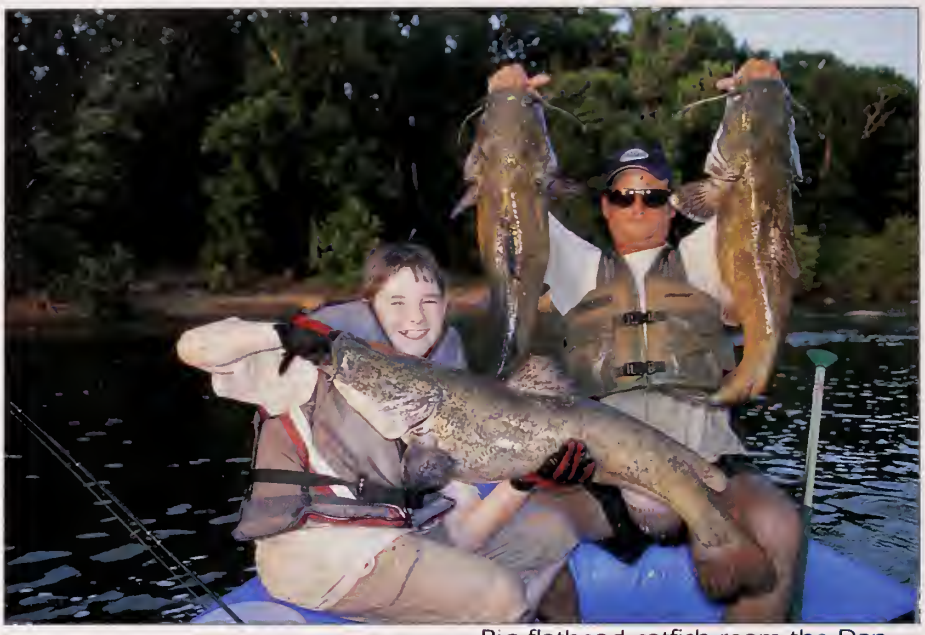
"From any of the boat landings, you can find wading opportunities within one-half mile," Williams said. "There are many wading spots throughout the river, although you must obey posted signs because some of the adjoining land is private."

VDGIF fisheries biologist, John Copeland, says one of the most popular spots for flatties is below Claytor Dam. "There's a public boat ramp and a good stretch of land for bank fishing," Copeland said. "From the Claytor Dam to the mouth of Little River has really been good for flatheads. That's where I see many of them."

Another good location is the deep hole by the Peppers Ferry Bridge (Route 114), Copeland said. In the Whitethorne area there is significant shoreline access, making it conducive to bank fishing. "You can also wade at Whitethorne," he said.

Pembroke has boat access and is good for big bottom-dwelling flatheads. There is some shoreline access near the ramp for shore-bound anglers.

Working downstream, the Nar-



©Marc N. McGlade

Big flathead catfish roam the Dan, Roanoke (Staunton), Clinch, New, and James Rivers. Mike Ostrander and his son show evidence that Virginia is an excellent region for these big bottom dwellers.

rows area is prime too. "There's a ramp near Pearisburg, in an area locally known as Bluff City, that has ample bank fishing. The ramp at Rich Creek, in Giles County, has a lot of good flathead water," he added, "and so does Glen Lyn, near the West Virginia line."

"We collect a large number of flatheads above Claytor Lake from Fosters Falls, and also one mile upstream at Shot Tower Falls," pointed out Copeland.

James River

Flatheads grow big in the Richmond section of the James River, evidenced by Ostrander's largest flathead that tipped the scales at 35 pounds. However, this introduced-species grows considerably larger.

"I've seen them up to 55 pounds, caught right here in the city limits of Richmond," said Ralph White, park manager and senior naturalist with the James River Park System. Within the confines of the park system—comprised of 550 acres stretching from the Huguenot Bridge to one-half mile beyond Interstate 95—lies one of the state's best flathead fisheries.

"Bosher's Dam to the Powhite Parkway is the main stretch of the James River that harbors sizable flatheads," added White. Out of that stretch, he said, the hot spot is Williams "Z" Dam to the Pony Pasture rapids.

"Although we look like a wilderness area, we are in the heart of the city and these fish undergo plenty of pressure. It's very important that anglers practice catch-and-release to sustain this fishery," he said.

"We don't have easy boat access to this area, and we want to keep it that way in the future," White said. Rafts, johnboats, and canoes are easily launched at Huguenot Woods or Pony Pasture, but boats on trailers won't find access points in this area.

White says extending the effort to access the river makes the experience even sweeter. "This incredible experience is what we're managing. We try to provide a great moment in nature for anglers to enjoy. That's the purpose of our park."

The air temperature isn't the only thing hot in summertime, so is the flathead fishing across our great state. Flatheads are prolific in the aforementioned rivers, and the possibility of catching a trophy (25 pounds or 40 inches in length) is within reach. Come enjoy one or more of these five beautiful rivers this summer and tap the whiskered bounty that awaits you. ☐

Marc McGlade is a freelance writer and photographer for national and regional magazines, newspapers, and Web sites. He is also a fishing instructor and lecturer.

For More Information

- For information about Virginia's exceptional flathead fishery, contact the VDGIF office serving that region: James River, (757) 253-7072; Dan River, (434) 392-9645; Roanoke (Staunton) River, (434) 392-9645; Clinch River, (540) 783-4860; New River, (540) 951-7923.
- Please preserve Virginia's flathead fishery by practicing catch-and-release.
- Flathead regulations: no minimum size, 20 per day, year-round.
- When wading, always be mindful of water levels and wear a personal flotation device.
- Contact the James River Park System by phone at (804) 646-8911, by e-mail at jriverpk@aol.com, or visit their Web site online at www.ci.richmond.va.us.
- To contact Mike Ostrander, call the James River Fishing School at (804) 938-2350, or e-mail mike@jamesriverfishing.com. Their Web site is www.jamesriverfishing.com.

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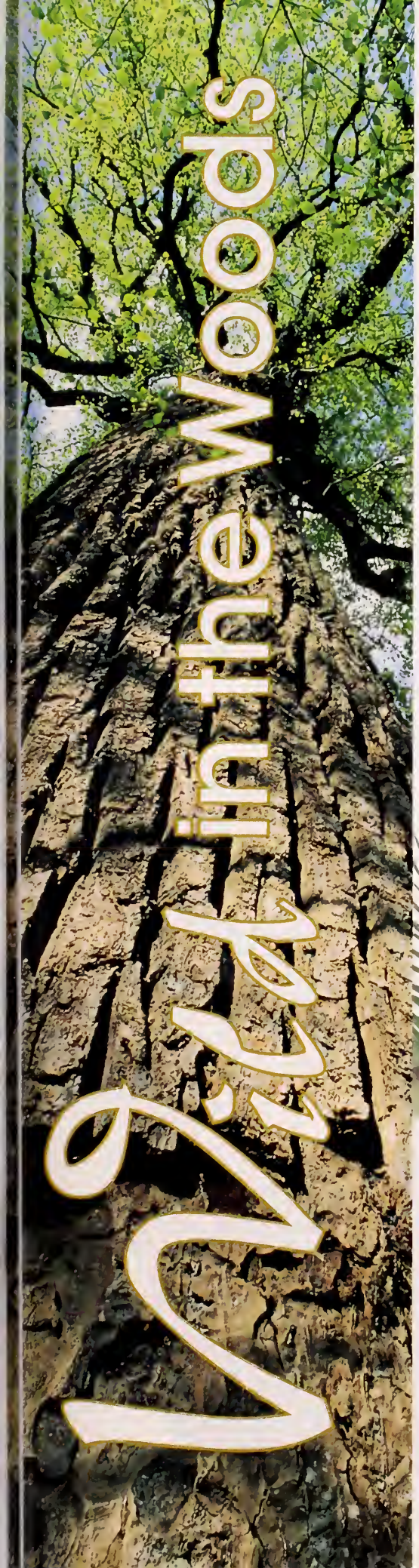


Where Sea Turtles Roam

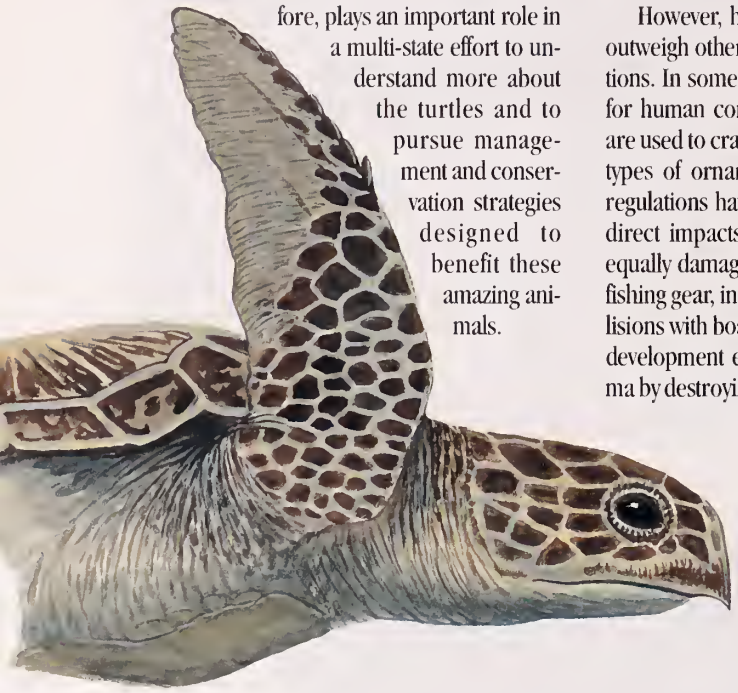
by Carol A. Heiser and Ruth Boettcher
illustrations by Spike Knuth

Kemp's Ridley
(Lepidochelys kempii)

Take a summer stroll along one of Virginia's quieter beaches and you are bound to find the usual bits and pieces of clam and oyster shells, strands of seaweed, and, maybe, the broken hull of a horseshoe crab that molted long ago. Swept to shore by the tides, these are the more mundane relics that hint at millions of organisms which spend their lifetime in the dark swells of the Atlantic. Occasionally, though, the casual beachcomber may stumble across a more mysterious find: the remains of a sea turtle.

Sea turtles are enigmatic creatures bound to the marine environment, which makes them difficult to observe and study. Despite continual advances in sea turtle research, basic life history questions, such as how long they live and at what age they reach sexual maturity remain unanswered. Sea turtles typically occur in Virginia's coastal waters from May to November, feeding in warm, shallow waters and occasionally nesting on ocean-facing beaches.

Five of the seven species of sea turtles that exist in the world today occur off Virginia's coast. These include the loggerhead, green turtle, Kemp's ridley, leatherback, and an infrequent hawksbill. Their status is either threatened or endangered. Virginia, therefore, plays an important role in a multi-state effort to understand more about the turtles and to pursue management and conservation strategies designed to benefit these amazing animals.



Atlantic hawksbill
(Eretmochelys imbicata)

Threats Facing Sea Turtles

It is estimated that only one out of every 5,000 sea turtle eggs fully develops into an adult animal. Sea turtles also require many years—in the decades—to ever reach reproductive maturity, which means that their population size grows very slowly. Species with a lengthy development period are very susceptible to natural and human impacts, because when too many individuals are removed from the population, the remaining animals simply do not have enough time to recoup the losses.

Sea turtles face many natural hazards. High winds and severe storms, which cause extensive beach erosion, take their toll on nests. Nests and hatchlings are also vulnerable to predators, such as raccoons, foxes, and ghost crabs. Hatchlings that make it to the water successfully often fall prey to fish and other marine life.

However, human impacts worldwide by far outweigh other threats facing sea turtle populations. In some cultures, eggs are still harvested for human consumption, and sea turtle shells are used to craft tortoise-shell jewelry and other types of ornamentation. Strong international regulations have helped to curb many of these direct impacts. However, indirect threats are equally damaging and include entanglement in fishing gear, ingestion of marine debris and collisions with boats. In North America, beachfront development exacerbates the sea turtle dilemma by destroying suitable nesting habitat.

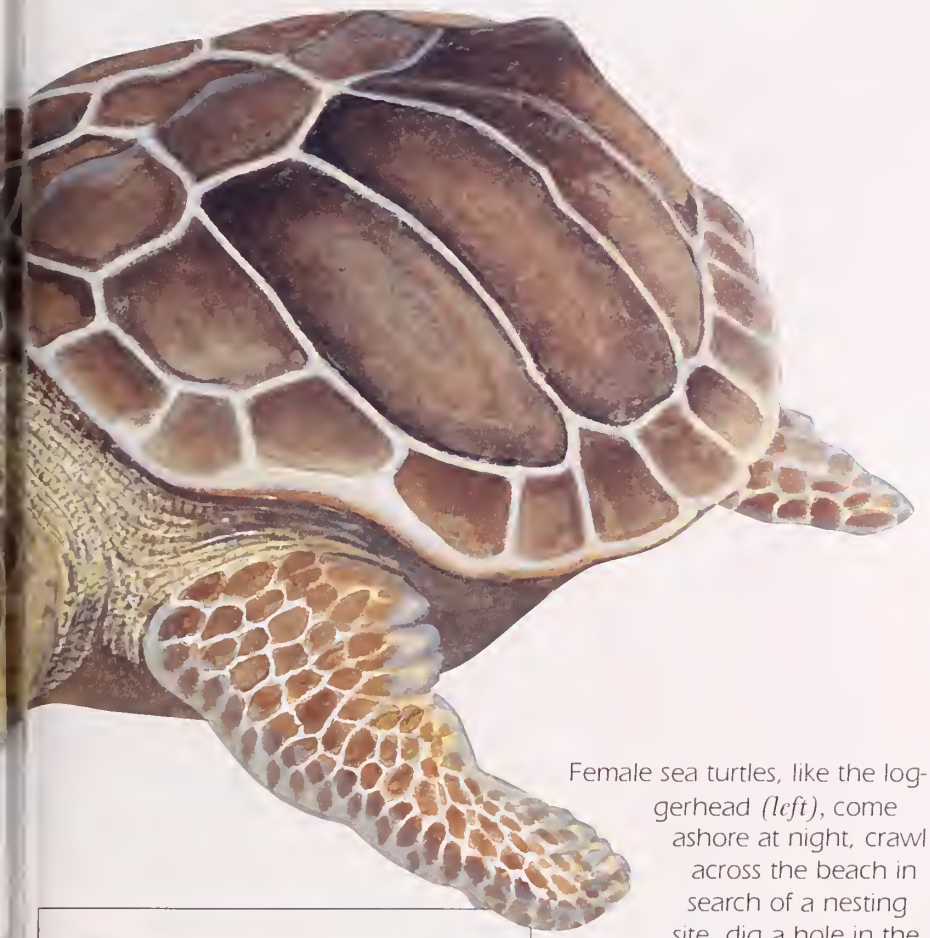
The Loggerhead

The most commonly seen sea turtle in Virginia is the loggerhead, which occasionally nests on our beaches from early June through August, primarily along the Virginia Beach oceanfront from False Cape State Park to Fort Story. Virginia is considered the northernmost limit of the loggerhead's nesting range and has had as many as eight nests reported in a single nesting season.

Loggerheads, so named because of their large heads and powerful jaws, are carnivores that feed mainly on invertebrates such as horseshoe crabs, blue crabs, and spider crabs. In the open sea they may feed on scallops or scavenge around fishing boats for squid, fish, and other discards. Sea turtles, in turn, are preyed on by sharks.

Sea turtles have a remarkable ability to return to the beach from which they originally hatched after spending years maturing in the open sea. A loggerhead probably does not reproduce until it is between 20 to 30 years old. Approximately every two to three years, a mature female loggerhead returns to her nesting

Loggerhead
(Caretta caretta)



Female sea turtles, like the loggerhead *(left)*, come ashore at night, crawl across the beach in search of a nesting site, dig a hole in the sand, and lay their eggs. In little more than two months the eggs hatch, and the young turtles will head straight for open water and the ocean.

beach to lay eggs. She emerges from the ocean at night, under the protective cover of darkness, and crawls across the beach to a suitable nest site, which is usually near or at the base of a primary dune. Using her rear flippers, she digs an 18 to 24 inch deep nest cavity shaped like an upside down light bulb, and she deposits an average of 120, golf ball sized eggs. When egg laying is complete, she carefully covers the nest with sand and slowly returns to the ocean. The female will lay a similar clutch of eggs every two weeks during a single nesting season.

The eggs are left uncared for and take about 63 days to incubate in the sand. As for most other turtle species, the sex of the sea turtles developing in the eggs is determined by the temperature inside the nest cavity: warmer temperatures produce female hatchlings, and cooler temperatures produce males.

Hatchlings emerge at night and make a fast beeline across the beach to the ocean. Upon entering the water, they swim nonstop until they reach a major oceanic current such as the Gulf Stream located off the Virginia coast. There they ride the current, drifting passively amid large rafts of floating vegetation for as long as 10 years. The baby loggerheads eventually return to warm, shallow coastal waters where they continue to develop into adult turtles.

Virginia is an important summer foraging area for immature sea turtles. The lower bay estuary—a mixing bowl of fresh and salt water—and the Eastern Shore's seaside lagoon system provide valuable developmental habitat. Beds of submerged vegetation and a rich diversity of bottom-dwelling fauna afford excellent forage and cover for the developing loggerheads.

Sightings and Strandings

Sea turtles will feed on crabs, scallops, squid, fish, and even jellyfish. During the summer months, the coastline along Virginia Beach and the Eastern Shore, becomes an important feeding area for immature sea turtles.

On a very rare occasion, a lucky person walking the beach at night may encounter a nesting sea turtle, or perhaps a nest that is hatching. If so, do not crowd or disturb the turtle(s), do not shine lights or snap flash photos, and turn off all lights in the immediate area including inside lights. Removing light sources minimizes the chance that the turtles will become disoriented and move towards land instead of sea. Sit quietly away from the nesting female or hatching nest. Your eyes will quickly adjust to the darkness and allow you to enjoy the experience without harassing the animals.

On other occasions, a sightseer walking along a beach may encounter a stranded turtle. A true *stranding* is defined as either a dead or a live, debilitated sea turtle found in the water or on a shoreline, whose death or debilitation cannot be directly attributed to an interaction with a fishery, a dredging operation, or any other lawfully conducted human activity.

Every year, between 200 and 300 dead sea turtles wash ashore or strand on Virginia's shorelines. The majority of strandings occur from the latter part of May to the end of June. In 2001, an astonishing 395 sea turtle strandings were confirmed and recorded by the Virginia Sea Turtle Stranding and Salvage Network, a group administered by the Virginia Institute of Marine Science Sea Turtle Program. Researchers are increasingly concerned, because last year's total represents the highest annual number of reported strandings in the Network's 23 year existence.

The cause of death for the majority of strandings in Virginia remain unknown, although every year a number of animals are found with injuries related to boat strikes. Additionally, several turtles strand each year with ingested fishing hooks or with some type of fishing gear trailing from the animal.

Regardless of how an unfortunate turtle met its demise, it is crucial to report such sightings. When a sea turtle carcass washes up ashore, all sorts of questions beg to be answered. What species is the turtle, and from which breeding population did it originate? Does it show any evidence of injury? What physical condition was it in just prior to its death? Did it die of natural causes or for other reasons?

Biologists attempt to answer these types of questions each time a dead sea turtle is found, because understanding the history of the animal's last few days can provide important clues that might help in the effort to protect these species. Without such documentation, it is very difficult to get a handle on the rate of sea turtle mortality and, therefore, on the status of total numbers.

A Partnering Effort

Several agencies and organizations share sea turtle data and expertise. All actions taken to further the recovery of sea turtles are done in strict compliance with the Endangered Species Act and may only be carried out by agencies and volunteers who operate under an Endangered Species Permit.

The Virginia Department of Game and Inland Fisheries' role is to increase general awareness of sea turtles and to assist with strandings. The Virginia Marine Science Museum in Virginia Beach runs a Stranding Center that responds to strandings and takes in sick or injured turtles for rehabilitation and eventual release back to sea. The Virginia Institute of Marine Science (VIMS), in Gloucester, coordinates the Sea Turtle Stranding and Salvage Network, responds to strandings, and engages in a variety of scientific studies. Some of their research includes monitoring the distribution of turtles in state waters, examining turtle feeding ecology, and tracking tagged adults and juveniles. VIMS is also the repository for stranding data and reports these events to the National Marine Fisheries Service.

The Virginia Marine Resources Commission has an active role in sea turtle conservation as well, providing boat transportation to remote areas for Network members, and participating in the development and implementation of fishery policies that minimize the impact of state commercial fisheries on sea turtles. In addition, Back Bay National Wildlife Refuge runs the only active nest monitoring program in the state, which covers the beaches that extend from the North Carolina border to Fort Story in Virginia Beach.

Leatherback
(Dermochelys coriacea)

If You Find a Sea Turtle

If you find a dead or live, debilitated sea turtle on the western shore of the Chesapeake Bay north of the James River, call the Virginia Institute of Marine Science's Sea Turtle Program at (804) 684-7313. For all other strandings, call the Virginia Marine Science Museum at (757) 437-6159.

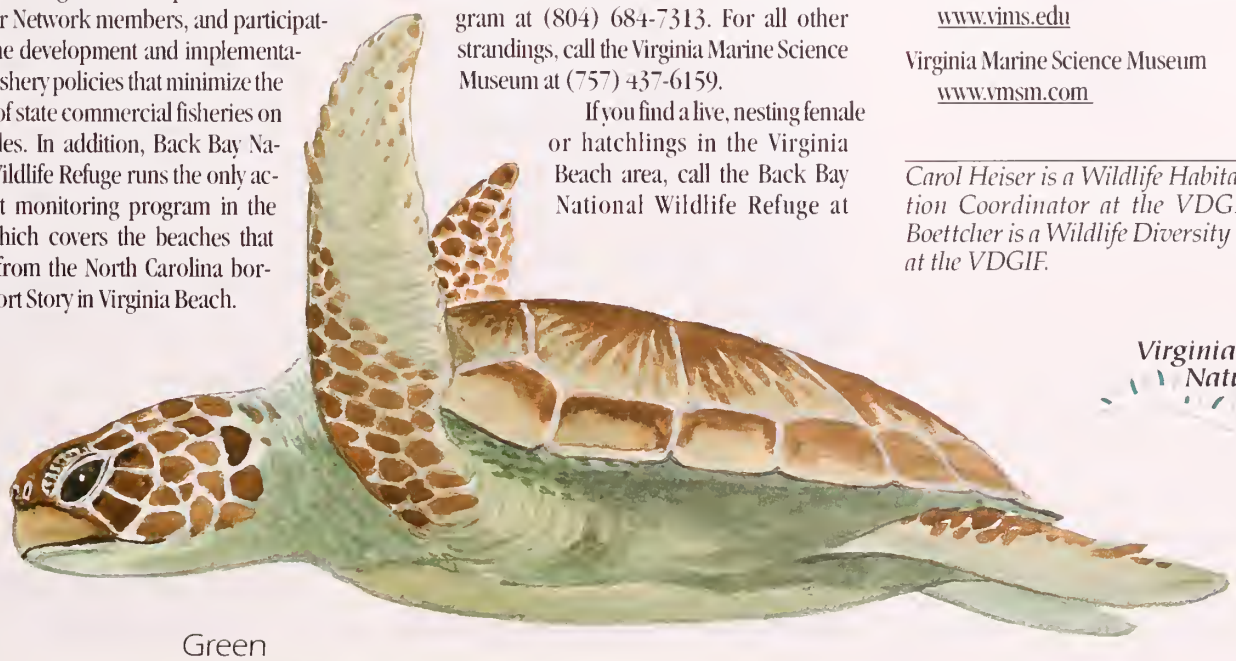
If you find a live, nesting female or hatchlings in the Virginia Beach area, call the Back Bay National Wildlife Refuge at (757) 721-2412. Sightings of nesting activity elsewhere may be reported to the Department of Game and Inland Fisheries at (757) 442-2429.

Learning More...

Virginia Institute of Marine Science
www.vims.edu

Virginia Marine Science Museum
www.vmsm.com

Carol Heiser is a Wildlife Habitat Education Coordinator at the VDGIF. Ruth Boettcher is a Wildlife Diversity Biologist at the VDGIF.



Green
(Chelonia mydas)

Virginia Naturally

Journal

VDGIF 2002 Calendar of Events

August 2–4: *Mother & Daughter Outdoors*, Holiday Lake 4-H Educational Center, Appomattox, Va. For information call (804) 367-6351.

September 7: *Women in the Outdoors*, Izaak Walton League, Centreville, Va. For information, contact Linda Layser at (703) 425-6665 or rglayser@msn.com.

September 13-15: *Wilderness Survival Weekend*, Lake Robertson, Lexington, Va. For information call (804) 367-6351.

September 21: *Virginia Outdoors Day*, Belle Isle State Park, Warsaw, Va. For information call (804) 367-6351.

AROUND THE CAMPFIRE

To Close for Comfort

Game Warden Steve Pike was patrolling Smith Mountain Lake when a frantic call came in. Some people were pulling friends in an inner tube behind their powerboat. They had been circling at high speeds making big waves to give a more thrilling tube ride, when the unthinkable occurred. The operator lost control of the craft as it bounced over a large swell; the impact threw both the operator and the passenger overboard into the water. Both were wearing lifejackets, but the operator of the craft did not have the kill switch attached to his lifejacket. The boat circled wildly out of control, trapping one person in the center, while the other was thrown clear.

Officer Pike raced to the scene, hoping to disable the engine before the boat and razor sharp propeller reached the victim. With only his firearm at his disposal Officer Pike took careful aim and shot the engine ten times before the boat finally slowed and came to a full stop. Fortunately no one was seriously injured. A kill switch attached to the operator would have prevented the entire incident. □

Free Fishing Days Date Correction

The Free Fishing Days listed in the 2001-2002 Virginia Wildlife Calendar (June 7, 8, and 9) are incorrect. The correct dates are May 31-June 2, 2002. We regret the error. □

Everything is Coming Up Doves.

Many thanks to Ken and Dee Wingen, of Richmond, who called *Virginia Wildlife* offering the magazine a chance to visit their home and to take pictures of their unusual garden.

Last summer produced a bumper crop for the Wingens. To their amazement, a pair of mourning doves decided to nest right in the middle of a flowerpot, located at the back door. Making themselves right at home in the flowerpot, the pair produced a couple of eggs within a week.

As unpredictable as the weather can be during the summer months, there were moments when the Wingens thought that they might lose their new family. To help keep the mother cool during extremely hot summer days a fan was placed near the nest and a temporary roof was place overhead, shielding the nest from bright sun and rain.

Living a "life of luxury" in their air-conditioned, rainproof flowerpot the pair eventually produce two new chicks. The Wingens quickly contacted family and friends about their new additions. Over the next three to four weeks the Wingens were treated firsthand and up close, to daily feeding rituals and hours and hours of preening by the chicks until they were grown enough to leave the nest.

It just goes to show, you never want to take those youngins for granted, because before you know it they're all grown up and have "flown" the nest. □

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On The Water

by Jim Crosby, Region 4 Boater Education Coordinator

A Boating Decision You Can Live With

One statistic sticks out in my mind. We have all heard the airline industry say "When accidents are measured against the number of flights, passengers, and miles flown around the world, airplanes are one of the safest modes of travel today."

If one analyzes boating accident statistics from the same point of view, one could reach the same conclusion about boats. The annual report of Virginia boating accidents has been published for 2001 and the facts are revealing.

My first point is to note that any boating injury or fatality is unacceptable and we all must work diligently toward the prevention of every single one. My second point is that among all the recreational sports, boating is one of the safer activities. That is not to say that we can't improve that safety record with some simple precautions.

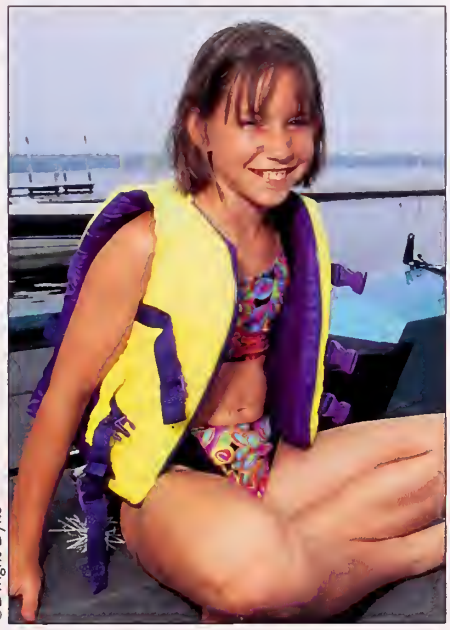
The first and simplest step toward preventing boating fatalities is to wear an approved life jacket of the appropriate size and style. The life jacket, described legally as a personal flotation device (PFD), must be appropriate to the type of boating you are doing and it must fit. Beyond that, it must be in serviceable condition. This means you can't wear it forever without replacing it. Ultraviolet light deteriorates man-made fibers, straps, and plastic buckles. Over time, fabrics will get frayed, part, and release the flotation material to float away while you sink.

We lost a boater last year because his life jacket was in unserviceable condition. He was seen in the water wearing it but when his body was recovered, he was not wearing it.

Of the 19 boating fatalities reported and investigated last year, 60 percent, or 11 total, were not wearing life jackets. Life jackets were not a factor in only seven of the fatalities. Two boaters died because they were in the water too long and suffered fatal hypothermia. The others died of traumatic injuries suffered in a crash or collision. One boater fell overboard and drowned because he had no flotation device. Only three of the 19 boaters who died were wearing a life jacket.

The accident reports show that 60 percent of the fatalities could probably have been prevented if the victims had been wearing a life jacket.

What else can be done to prevent accidents? The reports show that 73 of the 169, or 43 percent, of the reported accidents were caused by collisions with another vessel or fixed object. Think about that! If boaters would maintain a careful lookout to avoid collisions and wear their life jackets, we could cut a significant number of accidents and fatalities.



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Another step to reducing accidents could be taken if we could encourage our recreational boaters to slow down and eliminate reckless operation. This factor, excessive speed/reckless operation, accounted for 21 percent of the 2001 accident reports.

Did you notice that no mention was made of foul weather conditions contributing to accidents? The report specifically states, "The typical day for a boating accident in 2001 would have been one with clear skies, calm water, light winds, and good visibility.

The report takes the weather and mechanical failure factor out of the picture, and leaves only human error as the primary culprit for boating accidents. One philosopher said, "To be human is to error." This philosopher says, "To be a recreational boater is to be human, therefore we must take the error factor out of the human factor and disprove the statistics."

Speeding, reckless operations, failure to wear a PFD, and maintain a proper lookout are all human decisions that can lead to disaster. This year, let's make a decision to eliminate the human error factor and prove the statistics wrong! □

RECIPES

by Joan Cone

Catfish—The Cook's Delight

Our six catfish species have one thing in common. All are delicious! Larger catfish, flatheads, channels, blues, and whites, often can be steaked. They and the smaller bullhead species are excellent when filleted and skinned.

Of all Virginia's freshwater fish, these are the most versatile. The meat is mild, sweet, and suitable for varied recipes.

Menu

Hot Crab Dip
Almond Catfish Sauté
Greek Potato Salad
Creamy Cucumber Casserole
Bing Cherry Compote

Hot Crab Dip

½ pound regular crab meat
1 package (8 ounces) cream cheese, softened
½ cup sour cream
2 tablespoons salad dressing
1 tablespoon lemon juice
1¼ teaspoons Worcestershire sauce
½ teaspoon dry mustard
Pinch garlic salt
1 tablespoon milk
¼ cup cheddar cheese, grated

Remove cartilage from crab meat. In large bowl, mix cream cheese, sour cream, salad dressing, lemon juice, Worcestershire sauce, mustard and garlic salt until smooth. Add enough milk to make mixture creamy. Stir in 2 tablespoons grated cheese. Fold crab meat into cream cheese mixture. Pour into greased 1-quart casserole and top with remaining grated cheese. Bake in a 325° F. oven until mixture is bubbly and browned on top, about 30 minutes. Serve with crackers. Makes about 4 cups dip.

Almond Catfish Sauté

1 cup sliced almonds, broken slightly
Rind of 1 lemon, finely grated
Salt and pepper to taste
Cayenne pepper to taste
Flour for rolling fillets
1 egg, beaten or ¼ cup egg substitute
1½ pounds catfish fillets
2 tablespoons butter
2 tablespoons vegetable oil

Combine and mix the almonds, lemon rind, salt, and the peppers in a shallow bowl. Roll one fillet at a time in flour, then dip it in the beaten egg and immediately press each side into the almond mixture, turning to coat both sides. Heat the butter and oil until hot in a large skillet. Reduce the heat, sautéing the fillets at medium heat until crispy and brown, approximately 4 minutes for each side. Serves 4.

Greek Potato Salad

2 pounds new potatoes
¼ cup olive oil
¼ cup red wine vinegar
3 tablespoons mayonnaise
Salt and pepper to taste
½ teaspoon dried oregano

Cook potatoes in boiling water to cover for 30 minutes or until tender. Cool slightly and cut into 1-inch pieces. Whisk together oil and remaining ingredients and toss with potatoes. Makes 5 cups.

Creamy Cucumber Casserole

4 large cucumbers
1 cup chopped celery
⅓ cup milk
¼ teaspoon dried dill weed
1 can (10¾ ounces) condensed cream of celery soup
1 jar (2 ounces) diced pimientos, drained
¼ cup firm butter or margarine
1 cup biscuit baking mix

Cut cucumbers lengthwise into halves; remove seeds. Cut each half crosswise into ½-inch slices. Mix celery, milk, dill weed, soup and pimientos in ungreased 2-quart casserole. Stir in cucumbers. Cut butter into baking mix until crumbly and sprinkle over cucumber mixture. Bake uncovered in a 400° F. oven until hot and bubbly and topping is light brown, about 50 minutes. Makes 8 servings.

Bing Cherry Compote

1 cup bing cherries, halved and pitted
2 tablespoons honey
2 tablespoons tawny port
2 tablespoons orange juice
1 cup blackberries
1 cup blueberries

In a small saucepan, combine honey, port and orange juice. Stir over low heat to dissolve the honey. Let cool for 5 minutes. Combine fruits in a medium-sized bowl and gently stir in the honey mixture. Divide among 4 dessert dishes. ☐

Virginia's Finest

Wilderness Survival Weekend

For Women

September 13-15, 2002

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Location: Lake A. Willis Robertson, Lexington, Virginia

This program is for women 18 years and above who want to spend the weekend in the outdoors discovering wild edibles, gaining orienteering skills, and learning how to survive in the outdoors from professionals in a supportive and fun atmosphere.

This program is for you if:

- You want to meet others with the same interests as you.
- You want to be more confident when you are outdoors.
- You want to show yourself that You Can Do It!

All necessary equipment will be provided. No previous experience needed.

Registration: Apply by filling out and mailing the registration form at the bottom of this page, with $85 to the Virginia Department of Game and Inland Fisheries' Outdoor Education Program, 4010 West Broad Street, Richmond, VA 23230. Prior to the event, you will be mailed directions to Lake A. Willis Robertson and a list of suggested items to bring with you.

Deadline: August 6, 2002, 5:00 p.m. If registrants cancel on or before August 6, a full refund will be available. There are no refunds for registrants who cancel after August 6.

Name _____

Address _____

City/State/Zip _____

Phone (day) _____ (night) _____

E-mail _____

Workshop Fee is $85.00 and includes instruction in all sessions, program materials, use of equipment, a one-year subscription to *Virginia Wildlife* magazine, all meals and lodging. Fee must be included with completed registration. Make checks payable to Treasurer of Virginia.

☐ Check box if you currently have a *Virginia Wildlife* subscription.

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Agenda

Friday, September 13

- Registration (9 - 11 a.m.)
- Camp Set-up
- Welcome and Introductions
- Wild Edibles Course
- Campfire

Saturday, September 14

- Wilderness Survival Course
- Map and Compass Course
- Hiking and Shelter Building
- Sleep under the Stars

Sunday, September 15

- Breakdown of Camp
- Survival Challenge
- Celebration and Farewells

If you have any questions, please contact Hilary Welch at (804) 367-6351 or hwelch@dgif.state.va.us

I would like to be on the same team with:

_____

We will attempt to honor your preference

Make Checks Payable to: Treasurer of Virginia

Send Registration and Fee to:

Virginia Department of Game and Inland Fisheries
Outdoor Education Program
4010 West Broad Street
Richmond, VA 23230

If you have questions, please call: (804) 367- 6351
For information on other Outdoor Education Programs
visit our Web site at: www.dgif.state.va.us.

Naturally Wild

story and illustration
by Spike Knuth

Pileated Woodpecker

Dryocopus pileatus

This is a very impressive bird, and people get real excited when they see their first one. It's the largest of our woodpeckers, measuring about 17 inches. "Pileated" means "having a crest covering the pileum." They are often called "cock-of-the-woods."

Both sexes have a large red crest, but the female lacks the red on its forehead and the red streaks along the side of its throat. Both have white facial stripes and large white wing patches. They have large, wide, rounded wings with white underwing coverts. This flashing white is a distinctive field mark of the bird in flight.

The pileated woodpecker flies with an unusual irregular wingbeat. First it may be a moderately quick beat, then seems to hesitate to almost a slow-motion beat, then back again to a quicker pace. It is noisiest in spring, and its call is somewhat like that of the common flicker but louder. During courtship the pair goes through all manner of bowing, wing flashing, crest raising, and calling; and the male drums loudly on any resonating surface he can find.

They nest in self-made cavities, being strong diggers capable of cutting holes in live trees. In fact, many waterfowl, other birds, and some mammals use the abandoned nests. They lay an average of four eggs, and once hatched, the young are fed by regurgitation.

A bird of the woodlands, you'll find it in the gum and cypress swamps of southeast Virginia, the mixed hardwoods and pine of the piedmont, and the oak-beech forests of the mountains.

Pileated woodpeckers work up and down trees carefully to find beetle grubs, and they often feed on ants and grubs on the ground. They eat a variety of insect larvae, wild fruits and acorns. □

It's 8 a.m.

Do you know who your children are?

Fishing and boating are great ways to connect, and participating in a fishing and boating activity is a great way to do it. It's a wonderful opportunity for families to have fun, create new memories, and spend time together. Celebrate with us and discover just how much fun fishing and boating can be when you do it together.

VIRGINIA
Department of Game & Inland Fisheries

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